Amendments to the Claims:

1. (Currently Amended) A compound of formula (I)

(1)

or a salt, <u>or</u> solvate <u>thereof</u>, or physiologically functional derivative thereof, wherein:

n is an integer of from 2 to 8;

m is an integer of from 3 to 11, with the proviso that the sum of n + m is from 5 to 19;

R¹ is hydrogen or -XSO₂NR⁶R⁷;

wherein X is $-(CH_2)_p$ - or C_{2-6} alkenylene;

p is an integer from 0 to 6;

R⁶ and R⁷ are independently selected from hydrogen, C₁₋₆alkyl, C₃₋₇cycloalkyl, CONR⁸R⁹, phenyl and phenyl(C₁₋₄alkyl)-,

or R⁶ and R⁷, together with the nitrogen atom to which they are bonded, form a 5-, 6- or 7- membered nitrogen – containing ring;

and R^6 and R^7 are each independently optionally substituted by 1 or 2 groups independently selected from halo, C_{1-6} alkyl, C_{1-6} alkoxy, hydroxy-substituted C_{1-6} alkoxy,

C₁₋₆haloalkyl, CO₂R⁸, SO₂R⁸R⁹, -CONR⁸R⁹, -NR⁸C(O)R⁹ or a 5-, 6- or 7-membered heterocyclic ring;

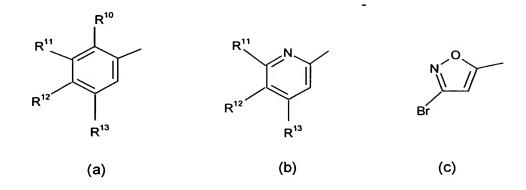
 R^8 and R^9 are independently selected from hydrogen, C_{1-6} alkyl, C_{3-7} cycloalkyl, phenyl and phenyl(C_{1-6} alkyl)-;

 R^2 and R^3 are independently selected from hydrogen, C_{1-6} alkyl, C_{1-6} alkoxy, halo, phenyl and C_{1-6} haloalkyl;

R⁴ and R⁵ are independently selected from hydrogen and C₁₋₄ alkyl with the proviso that the total number of carbon atoms in R⁴ and R⁵ is not more than 4,

and

Ar is a group selected from the group consisting of:



wherein R^{11} represents hydrogen, halogen, -(CH2)qOR14, -NR14C(O)R15, -NR14SO2R15,

 $-SO_2NR^{14}R^{15}$, $-NR^{14}R^{15}$, $-OC(O)R^{16}$ or $OC(O)NR^{14}R^{15}$, and R^{10} represents hydrogen, halogen or C_{1-4} alkyl;

or R¹¹ represents –NHR¹⁷ and R¹⁰ and –NHR¹⁷ together form a 5- or 6-membered heterocyclic ring;

 R^{12} represents hydrogen, halogen, $-OR^{14}$ or $-NR^{14}R^{15}$; $-OC(O)R^{16}$ or $-OC(O)NR^{14}R^{15}$;

R¹³ represents hydrogen, halogen, haloC₁₋₄ alkyl, -OR¹⁴ or -NR¹⁴ R¹⁵;

 R^{14} and R^{15} each independently represents hydrogen or $\mathsf{C}_{1\text{-}4}$ alkyl, or in the groups

-NR¹⁴R¹⁵, -SO₂NR¹⁴R¹⁵ and –OC(O)NR¹⁴R¹⁵, R¹⁴ and R¹⁵ independently represent hydrogen or C₁₋₄ alkyl or together with the nitrogen atom to which they are attached form a 5-, 6- or 7- membered nitrogen-containing ring,

 R^{16} represents an aryl (eg phenyl or naphthyl) group which may be unsubstituted or substituted by one or more substituents selected from halogen, $\mathsf{C}_{1\text{-}4}$ alkyl,

hydroxy, C₁₋₄ alkoxy or halo C₁₋₄ alkyl; and

q is zero or an integer from 1 to 4;

provided that when R^1 is hydrogen Ar is not a group (a) wherein; R^{11} is $-(CH_2)_qOR^{14}$, q is zero or 1 and R^{12} is OR^{14} , or R^{11} is $-(CH_2)_qOR^{14}$, q is zero and R^{13} is OR^{14} , or R^{11} is $-NR^{14}SO_2$ R^{15} or $NR^{14}COR^{15}$ and R^{12} is OR^{14} , or R^{11} and R^{13} both represent halogen and R^{12} is $NR^{14}R^{15}$; Ar is not a group (b) wherein R^{11} is $-(CH_2)_qOR^{14}$ and R^{12} is OR^{14} ; Ar is not a group (c), and when R^1 is $XSO_2NR^6R^7$, Ar is not a group (a) wherein R^{11} is $(CH_2)_qOR^{14}$ or $NR^{14}COR^{15}$, and R^{12} is OR^{14} .

2. (Currently Amended) A compound of formula (I) according to claim 1 wherein, in the group Ar, R^{11} represents halogen, -(CH₂)_qOR¹⁴, -NR¹⁴C(O)R¹⁵, -NR¹⁴SO₂R¹⁵, -SO₂NR¹⁴R¹⁵, -NR¹⁴R¹⁵, -OC(O)R¹⁶ or OC(O)NR¹⁴R¹⁵,

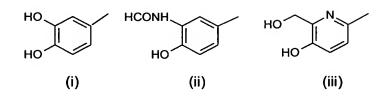
and R¹⁰ represents hydrogen,

or R¹¹ represents –NHR¹⁷ and R¹⁰ and –NHR¹⁷ together form a 5- or 6-membered heterocyclic ring;

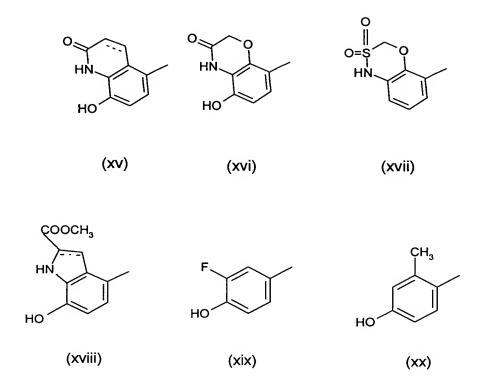
and

R¹³ represents hydrogen, halogen, halo, C₁₋₄ alkyl, -OR¹⁴, or -NR¹⁴R¹⁵; and all other substituents are as defined n claim 1.

- 3. (Currently Amended) A compound of formula (I) according to claim 1 or claim 2 wherein the group R^1 is attached to the meta-position relative to the $-O-(CH_2)_m$ link.
- 4. (Currently Amended) A compound of formula (I) according to claim 1 any of claims 1 to 3 wherein R^1 represents $SO_2NR^6R^7$ wherein R^6 and R^7 are independently selected from hydrogen and C_{1-6} alkyl.
- 5. (Currently Amended) A compound of formula (I) according to claim 1 any of claims 1 to 4 wherein R⁴ and R⁵ are independently selected from hydrogen and methyl.
- 6. (Currently Amended) A compound of formula (I) according to claim 1 any of claims 1 to 5 wherein R² and R³ each represent hydrogen.
- 7. (Currently Amended) A compound of formula (I) according to claim 1 any of claims 1 to 6 wherein n is 5 or 6 and m is 3 or 4 such that m + n is 8, 9 or 10.
- 8. (Currently Amended) A compound of formula (I) according to claim 1 any of claims 1 to 7 wherein Ar represents a group selected from the group consisting of:



$$(p-CH_3)C_6H_4CO \\ OCC_6H_4(p-CH_3) \\ OCN(CH_3)_2 \\ (xii) \\ (xiii) \\ (xiii) \\ (xiv)$$



- 9. (Currently Amended) A compound of formula (I) according to <u>claim 8</u> any of claims 1 to 8 wherein R¹ is hydrogen and Ar is selected from a <u>the group consisting</u> of structure (ii), (v), (vii), (viii), (ix), (xi), (xii), (xiii), (xiv), (xv), (xvi), (xvii) and (xviii).
- 10. (Currently Amended) A compound of formula (I) according to claim 8 any of claims 1 to 8 wherein R¹ is XSO₂NR⁶R⁷ and Ar is selected from a the group consisting of structure (iii), (iv), (xiv), (xvi), and (xix).
- 11. (Currently Amended) A compound of formula (I) selected from the group consisting of:

8-Hydroxy-5-((1R)-1-hydroxy-2- $\{[6-(4-phenylbutoxy)hexyl]amino\}ethyl)quinolin-2(1<math>H$)-one;

3-{4-[(6-{((2*R*)-2-Hydroxy-2-(8-hydroxy-2-oxo-1,2-dihydroquinolin-5-

yl)ethyl]amino}hexyl)oxy]butyl}benzenesulfonamide;

5-Hydroxy-8-(1-hydroxy-2-{[6-(4-phenylbutoxy)hexyl]amino}ethyl)-2*H*-1,4-benzoxazin-3(4*H*)-one;

3-{4-[(6-{[2-hydroxy-2-(5-hydroxy-3-oxo-3,4-dihydro-2*H*-1,4-benzoxazin-8-yl)ethyl]amino}hexyl)oxy]butyl}benzenesulfonamide;

4-Hydroxy-7-((1R)-1-hydroxy-2-{[6-(4-phenylbutoxy)hexyl]amino}ethyl)-1,3-benzothiazol-2(3H)-one;

4-Hydroxy-7-(1-hydroxy-2-{[6-(4-phenylbutoxy)hexyl]amino}ethyl)-1,3-benzothiazol-2(3*H*)-one;

3-{4-[(6-{[(2R)-2-(3-Fluoro-4-hydroxyphenyl)-2-

hydroxyethyl]amino}hexyl)oxy]butyl}benzenesulfonamide;

3-(4-{[6-({2-Hydroxy-2-[5-hydroxy-6-(hydroxymethyl)pyridin-2-

yl]ethyl}amino)hexyl]oxy}butyl)benzenesulfonamide;

 $3-[4-({6-[((2R)-2-Hydroxy-2-{4-hydroxy-3-}}$

[(methylsulfonyl)amino]phenyl}ethyl)amino]hexyl}oxy)butyl]benzenesulfonami de;

3-{3-[(7-{[(2R)-2-(3-Fluoro-4-hydroxyphenyl)-2-

hydroxyethyl]amino}heptyl)oxy]propyl}benzenesulfonamide;

3-(3-{[7-({2-Hydroxy-2-[5-hydroxy-6-(hydroxymethyl)pyridin-2-

yl]ethyl}amino)heptyl]oxy}propyl)benzenesulfonamide;

 $3-[3-({7-[((2R)-2-Hydroxy-2-{4-hydroxy-3-}}$

[(methylsulfonyl)amino]phenyl}ethyl)amino]heptyl}oxy)propyl]benzenesulfona mide;

3-{3-[(7-{[(2R)-2-Hydroxy-2-(8-hydroxy-2-oxo-1,2-dihydroquinolin-5-

yl)ethyl]amino}heptyl)oxy]propyl}benzenesulfonamide;

3-(3-{[7-({(2R)-2-[3-(Formylamino)-4-hydroxyphenyl]-2-

hydroxyethyl}amino)heptyl]oxy}propyl)benzenesulfonamide;

<u>a</u> salt <u>thereof</u>, <u>and a solvate thereof</u>, or physiologically functional derivative thereof.

- 12. (Currently Amended) A method for the prophylaxis or treatment of a clinical condition in a mammal, such as a human, for which a selective β₂-adrenoreceptor agonist is indicated, which comprises <u>administering</u> administration of a therapeutically effective amount of a compound of formula (I) according to <u>claim 1</u> any of claims 1 to 11, or a pharmaceutically acceptable salt, <u>or</u> solvate <u>thereof</u>, <u>or physiologically functional derivative</u> thereof.
 - 13. (Canceled)
- 14. (Currently Amended) A pharmaceutical formulation comprising a compound of formula (I), according to <u>claim 1</u> any of claims 1 to 11, or a pharmaceutically acceptable salt, <u>or</u> solvate <u>thereof</u>, or <u>physiologically</u> functional derivative thereof, and a pharmaceutically acceptable carrier or excipient, and optionally one or more other therapeutic ingredients.
 - 15. (Canceled)
- 16. (Currently Amended) A process for the preparation of a compound of formula (I), according to <u>claim 1</u> any of claims 1 to 11, or a salt, <u>or solvate thereof</u>, or physiologically functional derivative thereof, which comprises:
- (a) <u>deprotecting deprotection of a protected intermediate of formula (II):</u>

$$\begin{array}{c} R^{25} \\ R^{25}CHCH_{2}NCR^{4}R^{5}(CH_{2})_{n}O(CH_{2})_{m} \\ OR^{27} \end{array}$$

or a salt or solvate thereof, wherein R¹, R², R³, R⁴, R⁵, m and n are as defined for the compounds of formula (I) R²⁵ represents an optionally protected form of Ar, and R²⁶ and R²⁷ each independently represent either hydrogen or a protecting group, provided that the compound of formula (II) contains at least en one protecting group;

(b) reacting a compound of formula (XIII):

Wherein Ar is as defined above with a compound of formula (VI):

LCR
4
R 5 (CH $_2$) $_n$ O(CH $_2$) $_m$ R^3 (VI)

Wherein L is a leaving group such as halo (typically chloro, bromo or iodo) or a sulphonate (typically methanesulphonate) and R¹, R², R³, R⁴, R⁵, n and m are as defined for compounds of formula (I).

(c) reacting a compound of formula (XV):

wherein L is a leaving group as hereinbefore defined, with an amine of formula (XVI):

$$\frac{\mathsf{H_2NCR^4R^5(CH_2)_nO(CH_2)_m}}{\mathsf{R^3}}$$
 (XVI)

wherein R¹, R², R³, R⁴, R⁵, n and m are as defined for formula (I); and

(d) (i) reacting a compound of formula (XIII):

Wherein Ar is as hereinbefore defined and R³⁴ is a chiral auxiliary group, with a compound of formula (XVII):

$$\begin{array}{c}
O \\
\downarrow \\
R^4-C-(CH_2)_nO(CH_2)_m
\end{array}$$

$$\begin{array}{c}
R^2 \\
R^3$$
(XVII)

wherein R¹, R², R³, R⁴, n and m are as hereinbefore defined; followed where necessary by removal of said chiral auxiliary group R³⁴;

wherein Ar is as hereinbefore defined; with an amine of formula (XVI):

$$H_2NCR^4R^5(CH_2)_nO(CH_2)_m$$
 R^2
 R^1
 R^3
(XVI)

as hereinbefore defined.

under conditions suitable to effect reductive amination,

wherein said process may further optionally comprise one or more of followed by the following steps in any order:

- (i) optional removal of removing any protecting groups;
- (ii) optional separation of separating an enantiomer from a mixture of enantiomers:
- (iii) eptional conversion of converting the product to a corresponding salt, solvate, or
- (iv) eptional conversion of converting a group R¹, R² and/or R³ to another group R¹, R² and/or R³, or physiologically functional derivative thereof.
- 17. (New) A compound of the formula (I) according to claim 1, wherein m is an integer ranging from 3 to 7.
- 18. (New) A compound of the formula (I) according to claim 1, wherein the sum of n + m ranges from 5 to 12.
- 19. (New) A compound of the formula (I) according to claim 1, wherein p is an integer ranging from 0 to 4.

- 20. (New) A method according to claim 12, wherein the mammal is a human.
- 21. (New) A method according to claim 12, wherein the clinical condition is asthma.
- 22. (New) A method according to claim 12, wherein the clinical condition is COPD.
- 23. (New) A process for the preparation of a compound of formula (I), according to claim 1 or a salt, or solvate thereof, which comprises:

reacting a compound of formula (XIII):

Wherein Ar is as defined above with a compound of formula (VI):

LCR
4
R 5 (CH $_2$) $_n$ O(CH $_2$) $_m$ R 3

(VI)

wherein L is a leaving group and R¹, R², R³, R⁴, R⁵, n and m are as defined for compounds of formula (I);

wherein said process may further optionally comprise one or more of following steps in any order:

- (i) removing any protecting groups;
- (ii) separating an enantiomer from a mixture of enantiomers;
- (iii) converting the product to a corresponding salt, solvate, or
- (iv) converting a group R^1 , R^2 and/or R^3 to another group R^1 , R^2 and/or R^3 .
- 24. (New) A process according to claim 23, wherein the leaving group comprises a halo group.
- 25. (New) A process according to claim 24, wherein the halo group is selected from the group consisting of chloro, bromo, and iodo.
- 26. (New) A process according to claim 23, wherein the leaving group comprises a sulphonate group.
- 27. (New) A process according to claim 26, wherein the sulphonate group is a methanesulphonate group.

28. (New) A process for the preparation of a compound of formula (I), according to claim 1, or a salt or solvate thereof, which comprises:

reacting a compound of formula (XV):

wherein L is a leaving group, with an amine of formula (XVI):

$$H_2NCR^4R^5(CH_2)_nO(CH_2)_m$$
 R^2
 R^1
 R^3
(XVI)

wherein R¹, R², R³, R⁴, R⁵, n and m are as defined for formula (I); and wherein said process may further optionally comprise one or more of the following steps in any order:

- (i) removing any protecting groups;
- (ii) separating an enantiomer from a mixture of enantiomers;
- (iii) converting the product to a corresponding salt, solvate, or
- (iv) converting a group R^1 , R^2 and/or R^3 to another group R^1 , R^2 and/or R^3 .
- 29. (New) A process according to claim 28, wherein the leaving group comprises a halo group.

- 30. (New) A process according to claim 28, wherein the halo group is selected from the group consisting of chloro, bromo, and iodo.
- 31. (New) A process according to claim 28, wherein the leaving group comprises a sulphonate group.
- 32. (New) A process according to claim 28, wherein the sulphonate group is a methanesulphonate group.
- 33. (New) A process for the preparation of a compound of formula (I), according to claim 1 or a salt or solvate thereof, wherein said process is selected from the group consisting of (i) and (ii):
 - (i) reacting a compound of formula (XIII):

Wherein Ar is as hereinbefore defined and R³⁴ is a chiral auxiliary group, with a compound of formula (XVII):

$$\begin{array}{c}
O \\
R^4-C-(CH_2)_nO(CH_2)_m
\end{array}$$

$$\begin{array}{c}
R^2 \\
R^3$$
(XVII)

wherein R¹, R², R³, R⁴, n and m are as hereinbefore defined; optionally followed by removing said chiral auxiliary group R³⁴;

and (ii) reacting a compound of formula (XVIII):

wherein Ar is as hereinbefore defined; with an amine of formula (XVI):

$$H_2NCR^4R^5(CH_2)_nO(CH_2)_m$$
 R^2
 R^1
 R^3
(XVI)

as hereinbefore defined,

under conditions suitable to effect reductive amination,

wherein said process may further optionally comprise one or more of the following steps in any order:

- (i) removing any protecting groups;
- (ii) separating an enantiomer from a mixture of enantiomers;
- (iii) converting the product to a corresponding salt, solvate,
- (iv) converting a group R^1 , R^2 and/or R^3 to another group R^1 , R^2 and/or R^3 .